

Cobia released on popular Mississippi reef

The Mississippi Department of Marine Resources (MDMR) continues to move forward with its dedication to stock enhancement of the marine waters of Mississippi. The latest stock enhancement effort was of historic proportions with the ever-popular cobia. The MDMR, with the help of Aqua Green of Perkinston, Miss., made history with the first successful release of 7,500 cobia around Fish Haven 9 on the north side of Ship Island on Dec. 8 and 9.

The 6- to 8-inch long cobia were loaded at the Biloxi Small Craft Harbor on the MDMR boat, *Fish Haven*, using three tanks.

MDMR's Cobia Stock Enhancement Program was financed through the National Oceanic and Atmospheric Administration's Emergency Disaster Recovery Program, which was funded by Congress in 2006 to aid in the rehabilitation and recovery of marine fisheries in the Gulf of Mexico following hurricanes Katrina, Rita and Wilma.

"This was a pilot program," Mike Brainard, a marine biologist with the MDMR, said. "We contacted Aqua Green, which is an aquaculture facility in Stone

County, and wanted to utilize the various expertise of the private and public sector including Mississippi State University (MSU) and the Gulf Coast Research Laboratory (GCRL) at the University of Southern Mississippi.

"This is the first large-scale stock enhancement project to raise and release cobia in the northern Gulf of Mexico that I know of. We are very pleased and it went as well, if not better, than we expected."

To ensure the highest rate of survival at the time of the release, Shelly Nicholls of Aqua Green, monitored the tanks and kept the dissolved oxygen levels at nine parts per million from the Biloxi Small Craft Harbor to the release site. Other crucial ingredients to a successful release were properly matching salinity levels between 28 and 30 parts per thousand and the water temperature.

At the release site, Nicholls and the MDMR staff circulated water in the tanks from the Biloxi Small Craft Harbor with water drawn from the Mississippi Sound for 30 minutes to get the fish acclimated to the change in water temperature. All fish were then successfully released in water temperatures between 65 and 67 degrees.

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MDMR marine biologist, Mike Brainard, monitors temperature and dissolved oxygen in cobia tanks before the cobia are released.

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MDMR Artificial Reef Bureau adds inshore fishing reef in Pass Christian

The Mississippi Department of Marine Resources' (MDMR) Artificial Reef Bureau has completed work on the Pass Christian Key, which is an inshore reef comprised of deployed material from the Bay St. Louis Washington Street Pier.

The concrete rubble from the pier was donated to MDMR for the purpose of creating a new artificial reef in the

Mississippi Sound. The well-lit fishing reef is located a little over one half mile south of the beach and one mile east of the Pass Christian Harbor.

Since April 2007, the MDMR Artificial Reef Bureau has conducted 141 inshore material deployments in the three coastal counties, using 24,000 cubic yards of crushed concrete and

Continued on page 2, see Reef.

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VISIT MDMR ONLINE
www.dmr.ms.gov



Director's Notes

Dr. William Walker

Mother Nature cooperated this past year with the 23rd annual Mississippi Coastal Cleanup: Low tide uncovered more trash

for volunteers to pick up along the shoreline and relatively calm seas allowed boaters to get out to the barrier islands and comb those beaches as well. Organized by the Mississippi Department of Marine Resources (MDMR) and the Mississippi Marine Debris Task Force, the annual cleanup took place Oct. 15, 2011 at 77 sites in Hancock, Harrison and Jackson counties, and engaged more than 3,100 volunteers.

Volunteers collected 123,032 pounds of trash during the event, which is part of Ocean Conservancy's International Coastal Cleanup (ICC), the world's largest volunteer effort to clean up the marine environment. They collected 171 tires for recycling and filled 55 bags with recyclables. More than 20 tons of debris alone was removed from the Ansley Preserve marshes through Mississippi Power's Renew Our Rivers program, a partner in the Mississippi Coastal Cleanup.

As in previous years, volunteers tallied the items picked up during the cleanup on data cards and turned these in to the MDMR, providing valuable information about the amount, location and types of debris collected. Sources of marine debris can then be targeted for education or pollution-prevention campaigns, like Mississippi's fishing line recycling program, which began in 2008. Fishing line recycling bins were installed at public piers and boat launches all along coastal Mississippi and to date about 300 pounds of fishing line has been collected and sent for recycling.

As the holiday season comes to a close we are reminded that our coastal waterways provide food for our families, recreation and livelihoods for many of us. It's the lifeblood on which our fisheries and marine wildlife depend. The success of the Mississippi Coastal Cleanup and the support that the MDMR has received from the Mississippi Marine Debris Task Force and more than 80 sponsors is a clear indicator that many Mississippians do care about our coastal environment.


Executive Director

Reef continued from page 1

limestone. In addition, since September 2006, the Artificial Reef Bureau has conducted 115 offshore deployments using materials such as retired fishing vessels, concrete culverts, missile ballasts and even a 107,000-gallon tank donated by Stennis Space Center.

"We're extremely proud to be able to say that over 100 percent of Mississippi's pre-Katrina artificial inshore and offshore reefs have been restored," said Kerwin Cuevas, MDMR Artificial Reef Bureau Director.

**Activities of Marine Patrol
officers working under the
Joint Enforcement Agreement
with NOAA from
October 2010—November 2011**

Patrols	633
Contacts	4,912
Sea hours	2,906
Man hours	9,985
State violations	126
Federal violations	16



**MARINE PATROL CITATIONS
OCTOBER 2011—DECEMBER 2011**

Shrimp-1
Crab-14
Oyster-2
Live Bait-0
Net Fish-1
Fishing-90
Miscellaneous Seafood-1
Boat and Water Safety-35
Marine Litter-0
Miscellaneous-21

TOTAL-165

Cobia continued from page 1

“It was a success,” Brainard said. “We could not be happier and we would like to thank everyone who was involved in working with MDMR—Aqua Green, MSU and GCRL—for making this a successful project.”

The stock enhancement measure began on Oct. 1 when the 2- to 3-inch long cobia were transported from a hatchery in Miami to the Aqua Green facility where the fish were fed pellets in the holding tanks.

A few days before the deployment to the Fish Haven site, the diet shifted to shrimp and fish.

“We fed the fish twice a day,” Nicholls said. “We started out feeding the fish three times a day but cut back to twice a day. We also saw that some (females) were growing faster than others. So we pulled the bigger ones out of the tank and kept those together. We wanted to keep the size as equal as possible.

“To see how they would handle the release, we fed the fish a natural diet and they did great. It showed the fish are hungry and will do fine. They adapted fine.”

In terms of survival rates and overall growth rates, Brainard expects the fish to reach the current legal recreational size limit of 33 inches fork length in 18 to 20 months.

“When we got the fish from Miami, they were real skinny, about the diameter of a pencil,” Brainard said. “Cobia have an extremely fast growth rate and that’s why these fish are great candidates for a stock enhancement program.

“We are not sure on the exact survival rate because this has never been done in Mississippi. But I am thinking the number of predators (sharks) in the water is low during this time of the year and these fish will have the protection of the artificial reefs so it should increase survival rates.”

The bottom line? These fish are expected to join in with next year’s annual migration run between the Florida Keys and the mouth of the Mississippi River for spawning purposes.

“Right now, these fish will probably go out to one of our offshore reefs,” Brainard said. “They should join in with next fall’s migration.

“This is our first public/private program. Hopefully, we will be able to do it more often. This program has no down side. It should provide a lot of fun and excellent fishing for Coast fishermen for many years.”

Hundreds of TEDs distributed at the Gautier Mullet Festival

The Shrimp and Crab Bureau talked individually to hundreds of people about the Mississippi’s shrimp and crab fisheries and gear programs while at the Gautier Mullet Festival on Oct. 15 and 16. They distributed 440 crab trap Terrapin Excluder Devices (TEDs), enough to equip 110 crab traps, to people who volunteered to use the free gear. These types of TEDs fit into the funnels of the crab traps, preventing or “excluding” diamondback terrapins, a species of concern, from entering the traps and possibly drowning. Studies have shown the TEDs do not impact crab catch. To date, the Shrimp and Crab Bureau has distributed over 10,700 crab trap TEDs, enough to equip 2,677 traps. Contact MDMR to equip your traps for free.

A young festival goer enjoys checking out the diamondback terrapin that’s a species of concern in Mississippi waters.



Jim Franks, with the University of Southern Mississippi Gulf Coast Research Lab, standing, talks about spotted seatrout as part of a marine research awareness program.

Seatrout speakers draw interested crowd

The MDMR and partners held a free seminar on Mississippi’s spotted seatrout, Nov. 17, at the Bolton Building in Biloxi. More than 50 people attended to hear the keynote speaker, Jim Franks, with the University of Southern Mississippi Gulf Coast Research Lab (GCRL), speak on “Habitat & Spawning for Spotted Seatrout.”

Additional scheduled talks were: “Spotted Seatrout Assessment and Management,” by MDMR’s Finfish Bureau Director, Buck Buchanan and Read Hendon, GCRL; “Spotted Seatrout Culture,” by Reginald Blaylock, Ph.D., GCRL; “Spotted Seatrout Tricks of the Trade,” by Capt. Sonny Schindler, Shore Thing Charters.

The seminar is part of a series, facilitated by the Shrimp and Crab Bureau, aimed at enhancing familiarity between interested groups and increasing awareness of the programs, needs and opportunities that are relevant to marine research in Mississippi waters.

Volunteers clear more than 60 tons of trash from Coast

Thousands of volunteers combed Mississippi's beaches and waterways picking up marine debris at 77 designated cleanup sites during the 23rd annual Mississippi Coastal Cleanup, part of the International Coastal Cleanup—the world's largest volunteer effort to clean up the marine environment. During the 2011 Mississippi Coastal Cleanup, 3,102 volunteers picked up 2,218 bags of trash, along 262 miles of Coastal waterways in Hancock, Harrison and Jackson counties. The cleanup is organized by the Mississippi Department of Marine Resources' Public Affairs Bureau and Mississippi Marine Debris Task Force. The Mississippi Coastal Cleanup returned to the beaches and barrier islands and again expanded its reach through its partnership with Mississippi Power's Renew Our Rivers program, cleaning four sites on the days leading up to the Oct. 15, 2011 cleanup and one additional site on cleanup day (see statistics on page 5).

Volunteers collected 123,032 pounds of trash including 171 tires—that's 61.5 tons of marine debris. This included items too large to fit in trash bags such as household appliances and remnants of homes washed away during Katrina. Other items found were: a channel marker, jet ski, car bumper, propane tanks, refrigerators, coffee maker, furniture, golf club, tractor tire, blow-up mattress, fire alarm, parking barricade, electrical wire, plastic window, baby carriage, wooden door, dead alligator gar, hypodermic needle, Bacardi sign, television, child's car seat and 500 square feet of plastic sheeting was found on Sand Island. Also, volunteers collecting trash at four sites in Ocean Springs separated out and filled 55 bags with recyclable items.

During the International Coastal Cleanup, hundreds of thousands of people across the world spend three hours combing the beaches and waterways to pick up trash that pollutes our waters, harms marine life, hampers tourism and poses health risks to beach-goers. Worldwide, results are still being tabulated for the 2011 International Coastal Cleanup. In 2010, more than 600,000 volunteers in 108 coun-

tries removed more than 8 million pounds of debris from the ocean, rivers, lakes and waterways.

"Our annual coastal cleanup is a reminder that, yes, we can make a difference in keeping our shorelines clean and litter-free: One cigarette butt at a time, one piece of fishing line at a time, one plastic bag at a time," said Lauren Thompson, state coordinator for the Mississippi Coastal Cleanup and public relations director for the Mississippi Department of Marine Resources.

The mission of the International Coastal Cleanup is to remove debris from shorelines, bayous, bays, rivers, waterways and beaches; collect information on the amount and types of debris collected; educate people on the issue of marine debris; and use the data collected to effect positive change. Volunteers clean beaches and collect information on what they find, using the International Coastal Cleanup Data Card. State and country coordinators tabulate and provide the data to the Ocean Conservancy in Washington, D.C. to be included in its annual International Coastal Cleanup report. Over the years, data from the cleanups have been used to enact local, state, national, and even international legislation and agreements.

After the Mississippi Coastal Cleanup, Bob Taylor, president of the Gulf Coast Restaurant Group (which includes Half Shell Oyster House, Bob's Burger Factory, Southern Flavor Catering & Events, High Cotton Grill and The Quarter), treated 550 volunteers to a free lunch of hotdogs, hamburgers, chips, fruit and cold drinks served by their staff from 11 a.m. to 1 p.m. at the Ken Combs Pier parking area at Courthouse Road and Hwy. 90 in Gulfport. Sysco, Gulf Coast Produce, Cabot Cheese and Coast Coca-Cola Bottling Co. also provided food and drink for the lunch.

In Jackson County, 850 volunteers received a free barbecue lunch of pulled pork and beef brisket, chips and drinks at the Estuarine Education Center at Mississippi Gulf Coast Community College in Gautier courtesy of The Shed Barbeque & Blues Joint.

In Hancock County, the Office of Congressman Steven Palazzo and the Bay St. Louis Rotary Club treated volunteers to hotdogs at a cookout held at the Depot in Bay St. Louis while BB's Snowballs provided snowballs.

Those volunteers who cleaned the beach and filled out data cards, documenting what litters our shores and waterways, also received a reusable fold-up tote, compliments of Chevron Pascagoula Refinery.

"The turnout for this year's coastal cleanup was tremendous," Thompson said. "MDMR is very grateful to all the volunteers and zone captains who made a commitment to help clean up our beaches and waterways during the Mississippi Coastal Cleanup and for the strong support of the Mississippi Marine Debris Task Force and our 80 sponsors."



A young lady, who is a member of the Boys and Girls Club of the Gulf Coast's East Biloxi Unit, thoughtfully places trash in a bag at the Porter Avenue site in Biloxi.

Volunteers at East Beach in Ocean Springs, right, cover the pier area to make sure no debris is left behind.

Our Lady Academy's soccer team relaxes after the cleanup by enjoying hotdogs and snowballs at the Depot in Bay St. Louis.



Photo courtesy of Cynthia A. Moncreiff

2011 STATISTICS

3,102 volunteers
123,032 pounds of debris
262 miles cleaned
2,218 bags filled
77 designated sites

Harrison County

1,467 volunteers
 1,069 bags of trash
 23 sites

Hancock County

441 volunteers
 375 bags of trash
 20 sites

Jackson County

1,124 volunteers
 696 bags of trash
 30 sites

Barrier Islands

70 volunteers
 78 bags of trash
 4 sites

Peculiar Items Found

refrigerators
 coffee maker
 furniture
 golf club
 tractor tire

2011 SPONSORS

SEA TURTLE:

BP; Chevron Pascagoula Refinery;
 Gulf Coast Restaurant Group;
 Matthews Brothers Inc; Mississippi
 Department of Environmental Quality;
 Mississippi Department of Marine
 Resources; The Bait Box

SHARK:

Cable One Advertising; Delta
 Sanitation, A Waste-Pro Company;
 Lamar Outdoor Advertising-Mississippi
 Gulf Coast; Mississippi Media; Ocean
 Conservancy; The Shed Barbeque and
 Blues Joint; The Sun Herald; Waste
 Management

DOLPHIN:

Allen Beverages Inc.; Beverage
 Association of Mississippi; Coast Coca-
 Cola Bottling Co., Inc.;

Coca-Cola Bottling Co., Consolidated;
 Conrad Yelvington Distributors Inc.;
 Fisher Safety; Milner Rental Center;
 RPM/Domino's Pizza; Ship Island
 Excursions; Sysco Foods

COBIA:

Biloxi-D'Iberville Press; Ingalls
 Shipbuilding; Keep Mississippi
 Beautiful; K99FM, Magic 93.7, 92.5
 The Beat & News Radio 104.9; Knight-
 Abbey Printing and Direct Mail;
 Mississippi Power; Ocean Springs
 Gazette; Sea Coast Echo; The Dive
 Shop; WLOX-TV 13

MULLET:

Academy Sports & Outdoors; Ashman
 and Son, LLC; Bay Ice; BB's Bar-B-
 Que & Snak Shak;
 Cabot Cheese; Coast Electric; Gulf
 Coast Produce

The Mississippi Coastal Cleanup is made possible by the Mississippi Marine Debris Task Force, which includes representatives from Ashman & Son, LLC; Chevron Pascagoula Refinery; City of Biloxi; City of Gautier; City of Gulfport; City of Moss Point; City of Ocean Springs; City of Pascagoula; Coastal Rivers; Delbert Hosemann Secretary of State; MDMR Marine Patrol; Eco-Tours of South Mississippi; Gautier Pride; Grand Bay National Estuarine Research Reserve; Gulf Coast Heritage Trails Partnership; Gulf Islands National Seashore; Hancock County Beautification Committee; Hancock County Board of Supervisors; Hancock County Chamber of Commerce; Hancock County Solid Waste; Harrison County Beautification Commission; Harrison County Board of Supervisors; Harrison County Sand Beach Department; Harrison County Sheriff's Department; Harrison County Utility Authority; Ingalls Shipbuilding; Jackson County Board of Supervisors; Jackson County Chamber of Commerce; Jackson County Solid Waste Department; Keep Mississippi Beautiful; Keesler Air Force Base; Mississippi Air National Guard CRTC-Gulfport; Mississippi-Alabama Sea Grant Consortium; Mississippi Department of Environmental Quality; Mississippi Department of Marine Resources; Mississippi Gulf Coast Community College; Mississippi Power; Mississippi State University Coastal Research and Extension Center; Naval Construction Battalion Center; North Gulfport Community Land Trust; Office of Congressman Steven Palazzo; Rotary International District 6840; Sea Coast Echo; University of Southern Mississippi-Gulf Coast Research Laboratory.

2012 Marine Information Calendar features

The Mississippi Department of Marine Resources (MDMR) has chosen the winners of the 2012 calendar art contest. The featured artwork was selected from over 1,500 entries submitted by third- through sixth-grade students from 33 schools in Hancock, Harrison and Jackson counties. Students were asked to create artwork following the theme “Preserving and Enjoying Mississippi’s Coastal Resources.”

The 2012 calendar showcases imaginative artwork as well as useful marine information. The free calendar highlights MDMR programs and contains tide information, sunrise and sunset times, moon phases, reef coordinates, size and possession limits and information on boating safety, Mississippi saltwater fishing records and marine debris.

Thank you to the following schools for participating in the contest: Anniston Avenue Elementary, Bay Waveland Middle, Cedar Lake Christian Academy, Central Elementary, Cherokee Elementary, Coast Episcopal School, Delisle Elementary, D’Iberville Elementary, D’Iberville Middle, Eastlawn Elementary, Gorenflo Elementary, Hancock North Central Elementary, Harper McCaughan Elementary, Jeff Davis Elementary, Magnolia Park Elementary, Nicholson Elementary, North Bay Elementary–Bay St. Louis, North Woolmarket Elementary, North Woolmarket Middle, Oak Park Elementary, Ocean Springs Middle, Our Lady of Fatima, Pass Road Elementary, Resurrection Catholic School, South Hancock Elementary, St. James Catholic Elementary, St. Martin Center for Gifted Excellence, St. Martin Middle, St. Martin North Elementary, St. Martin Upper Elementary, Taconi Elementary, Three Rivers Elementary, and Woolmarket Elementary.

The calendar was printed through grants from the Sport Fish Restoration and the Tidelands Trust Fund Program.



January



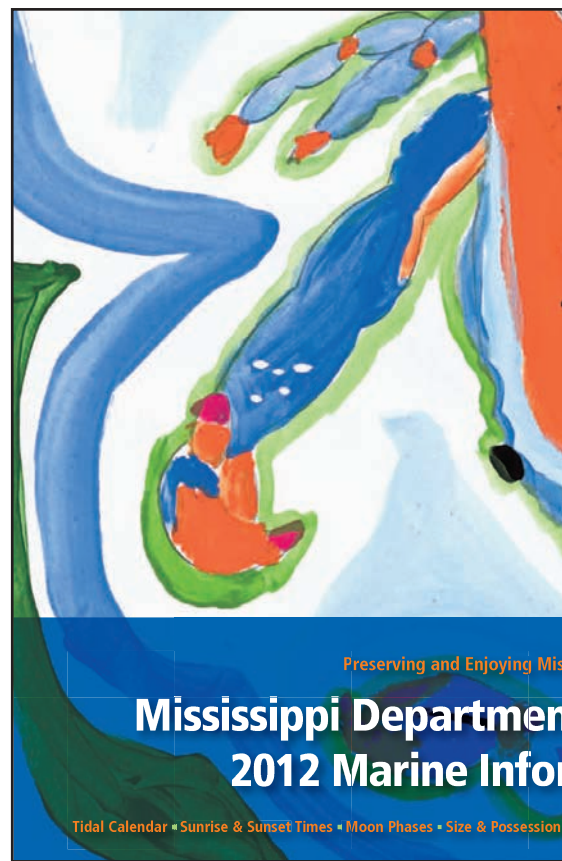
February



March



April



May

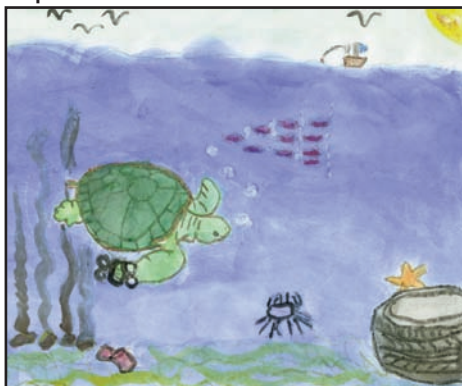


June

atures Coast students' winning artwork



September



October



July



November



August



December

Winners of the 2012 calendar art contest are as follows:

Months:

- January, Christina Larson, age 11, Coast Episcopal School
- February, Michael Burns, age 9, Coast Episcopal School
- March, Corey Jennings, age 11, Bay Waveland Middle School
- April, Andrea Franklin, age 10, North Bay Elementary School, Bay St. Louis
- May, Ein Roberts, age 10, D'Iberville Middle School
- June, Richard Barhonovich, age 10, Our Lady of Fatima
- July, Destiny Martin, age 9, Jeff Davis Elementary School
- August, Abby Brandenstein, age 9, Cherokee Elementary School
- September, Breanna Beckner, age 10, St. Martin Gifted Center for Excellence
- October, Dylan Beck, age 10, Our Lady of Fatima
- November, Brandon Knue, age 10, North Woolmarket Elementary
- December, Mikayla Roberts, age 12, Woolmarket Elementary School

Front Cover:

- Abby Brandenstein, age 9, Cherokee Elementary School

Back Cover:

From left;

- Hanna Tran, age 9, D'Iberville Elementary School;
- Joey Green, age 10, Resurrection Catholic School;
- Raylen Ladner, age 10, North Bay Elementary School, Bay St. Louis

Please visit our Web site at the link below to see a list of locations where the calendars are available. Calendars are also available at local bait shops.

<http://www.dmr.ms.gov/news-a-events/recent-news/271-11-130-jgl>



Grand Bay NERR hosts first ever research symposium and Grand Bay Day

On Friday, Oct. 14, over 65 scientists, land managers, educators, and graduate students gathered at the reserve to participate in the first of its kind research symposium focused on the habitats in the Grand Bay area. The symposium was dedicated solely to highlighting the significant research

Over 65 people attended a research symposium and Grand Bay Day that included professional sharing and boat trips to the marshes.



that has taken place in and around the reserve. Since the reserve's designation in 1999, over 150 research-oriented projects have been conducted within the Grand Bay environs. The results of the projects are being used to inform management efforts of critical coastal resources.

The workshop consisted of several 30-minute presentations highlighting various research efforts at the reserve, including marsh restoration, fish and marsh bird ecology, mercury monitoring, habitat mapping, and management of critical pine savanna habitats. During the evening, over 25 poster presentations, made mostly by graduate students working in the Grand Bay estuary served to highlight on-going studies, which are not yet completed. The workshop, designed to allow for professional sharing among natural resource professionals and encourage future collaborative efforts, was a huge success.

Several of the researchers stayed over an extra night and presented their data to the public on Oct. 15 during the Reserve's first "Grand Bay Day." Grand Bay Day was established to highlight the education, stewardship and research activities that go

on at the reserve. "One of the most frequently asked questions that we get from visitors is, 'What do you do here?'" said Jennifer Buchanan, Education Coordinator for the Reserve. Grand Bay Day gives the public an opportunity to observe researchers at work and learn a little about what they are doing. For the early risers, an opportunity was provided to participate in the Mississippi Coastal Cleanup as a stewardship activity to remove marine debris. Boat trips into the marsh gave visitors the chance to experience our coastal habitats from the water and visit some of the field research sites. The visitors had a grand day in Grand Bay and left more informed and engaged in coastal issues.

Based on the positive feedback from all attendees, the reserve staff feel strongly that these events are a critical first step toward meeting the reserve's research program goal to provide a stable environment for natural resource investigators through long-term protection of the site to: gain a greater knowledge about coastal resources; conduct studies relating to pertinent coastal management issues; collect information necessary for better management of our coastal resources; and make this information available to stakeholders.



Heron Bay gets another clean sweep

On Oct. 15, 2011 volunteers gathered once again in southeastern Hancock County in an effort to remove what was left of the Katrina storm debris from a unit of the Heron Bay Coastal Preserve near the community of Ansley, Miss. In a combined effort of partnership between

Mississippi Power's Renew our Rivers Program, Coast Electric Power Association, MDMR's Coastal Preserves Program and 20 volunteers from the Gulfport Naval Construction Battalion Center, 41,500 pounds or 20.75 tons of debris was removed from the 10-acre site. All of the debris, which was mostly treated lumber and man-made materials, filled seven 30-cubic yard dumpsters. Six large utility poles were also pulled off of the site as well as a large fiberglass boat cabin. This cleanup was the third on this site in the last year and a half with a total of over 65 tons of debris removed from the area. All of the large debris has now been removed from the site, but the partners are talking about scheduling one last outing this fall to comb over the site to remove any remaining debris.



Volunteers from the Gulfport Naval Construction Battalion Center work together to remove debris from a Coastal Preserve site in Ansley.



A pair of slash pines recently planted in the 88-acre site on the west end of Deer Island.



Aerial image of the 88-acre restoration area on the west end of Deer Island. Note the trees being planted in the middle of the site.

Slash pines are planted on Deer Island

The Army Corps of Engineers, Mobile District has begun the next phase of the Mississippi Coastal Improvements Program (MSCIP) project located on Deer Island. This phase of the project will include the planting of more than 300,000 trees, shrubs, herbs and grasses on the newly restored area on the west end of the island. It is important to establish a diverse maritime habitat on the new shoreline to prevent wind and wave erosion as well as provide areas to support local wildlife and nesting birds. The survival of the plants is crucial to the stabilization of the new sediment that has been deposited on this 88-acre restoration site. The vegetation planting is expected to take several months. The plants will be watered and monitored for one year to ensure their survival.



Seafood Safety Corner



Jeff Davis



Jessica Rankin

sonnel are proud to announce that the samples that were taken passed the study and maintained temperatures below the guideline. Mississippi Seafood

Safety Program is in conformity with the federal requirements.

Public outreach has been a continuing effort for the STB in taking the message of seafood safety and marine education into the community. Several staff members from the MDMR Office of Marine Fisheries volunteer in many of the outreach efforts by visiting and doing demonstrations during field days at the different schools in the three coastal counties. In the past few months, the STB has been involved and participated in several public outreach events with the Artificial Reef Bureau, Finfish Bureau, Shellfish Bureau and Shrimp and Crab Bureau. Messages have included: the existing threat of invasive species threatening the coastal ecosystem of our marine waters and land; current rebuilding of reef areas for fishermen to enjoy; updating people about regulations on marine fisheries and on-going projects and surveys.

October was a busy month with two days at the Gautier Mullet festival (15,000 estimated visitors) and the week-long Jackson County Fair in Pascagoula (30,000 estimated visitors).

The STB attended two Veteran's Day celebrations, one in Gulfport and one in D'Iberville, to honor the veterans and their families in the military.

The MDMR inspectors are currently conducting quarterly inspections at seafood processing facilities. With cold weather approaching, it is important that seafood dealers maintain their facilities and verify their equipment works properly. Severe cold weather can cause pipes to freeze; consequently, processing equipment will not work properly.

At the beginning of 2011, the Interstate Shellfish Sanitation Conference established guidelines to attempt to control the amount of *Vibrio* bacteria in shellfish. The harvest time and temperature matrices for oyster harvesters changed for Mississippi waters. This caused some Hazard Analysis and Critical Control Point (HACCP) Plans to change for seafood dealers. The Seafood Technology Bureau (STB) staff is continuing its efforts to help everyone who has not completed their HACCP Plan changes. Please contact Seafood Officer Jeff Davis at 228-374-5000 if you need help.

In October, FDA personnel visited Mississippi to observe harvesting practices and to take samples to monitor the time/temperature matrices and ensure the oysters were safe for consumption. It is part of their bi-annual evaluation visits to seafood processing plants and facilities. MDMR per-

New CZM project began in November

The MDMR, as Mississippi's federally approved state coastal zone management program, receives funding from the National Oceanic & Atmospheric Administration (NOAA) annually for Coastal Zone Management Act administration and enhancement of Mississippi's coastal resources. MDMR Office of Coastal Ecology continues two projects under NOAA funding, with a third project initiated. The final phase of the Public Access project has commenced with the ongoing update of the inventory and assessment of possible enhancements to Mississippi's coastal public access sites. An online GIS map is available on MDMR's Web site (<http://gis.smpdd.com/dmrpublicaccess/>) detailing public access locations across Mississippi's coast. A management plan is the ultimate goal for this project, providing analysis of current public access sites, their viability, and future development prospects and recommendations.

The Coastal Hazards Mitigation project continues with its final phase, and is providing technical and practical support to communities within Mississippi's coastal zone, with the aim to enhance community participation in the Community Rating System (CRS), a voluntary component of the National Flood Insurance Program administered by the Federal Emergency Management Administration. A local consultant has reviewed each community's flood mitigation plan and provides assistance to each coastal community in the identification and implementation of additional flood mitigation methods, thereby achieving additional flood insurance premium discounts for resident homeowners in those coastal communities.

A new project began November 2011, and will assess and inventory the hardened shoreline of Mississippi's coast, and develop an alternative shoreline management guideline to promote sustainable shoreline alternatives to bulkheads in Mississippi's coastal waterways. It is scheduled to be completed in 2013.

Veteran's Day participants visit the MDMR Seafood Technology Bureau booth before the parade began in downtown D'Iberville.





Take a Bow

Recognizing employees' commitment to excellence



**American
Heart
Association®**
Learn and Live

Human Resources will be coordinating on-site classes for CPR certification and First Aid. Two of our MDMR employees, Marty Jones and Mario Sapet, are now certified to teach classes in CPR/First Aid. Employees may attend one of these classes to become certified in CPR or obtain re-certification. Those who complete the CPR Certification will receive a card showing that the individual has successfully completed the most current objectives and skills evaluations in accordance with the curriculum of the American Heart Association Modules. The certification card will be good for two years. Stay tuned for upcoming CPR class dates!



MDMR staff wore pink in honor of Breast Cancer Awareness Month on Oct. 26, 2011. Standing, from left to right, Sally Richards, Debbie Snawder, Christy Royals, Michaela Hill, Ava Coleman, Lynn Moore, Shelly Becker, Joe Jewell. Kneeling, from left to right, Bill Richardson, Christine Murrell, Rick Burris.



The Southern Public Relations Federation (SPRF) recognized MDMR Office of Coastal Management and Planning Marine Administrator Susan Lepoma Perkins, APR, for outstanding work in the field of public relations during the Lantern Awards ceremony held Oct. 3 at the Marriott Grand Hotel in Point Clear, Ala. Awards were given in 25 categories.

Perkins received Certificates of Merit in three categories: Publications-External Newsletter: Heritage Happenings newsletter; Brochure/Folder: \$5K-10K: 2011 Coastal Development Strategies Conference mailer; and Media/Press Kit-Print: 2011 Coastal Development Strategies Conference press kit.

Founded in 1972, SPRF is the umbrella organization for the Public Relations Council of Alabama, Public Relations Association of Mississippi, the Public Relations Association of Louisiana and the Emerald Coast Public Relations Organization. SPRF exists to further the professional and networking interests of today's public relations and communication professionals in private, public and nonprofit businesses and organizations. Along with networking, SPRF serves to advocate on behalf of and assist its members through ongoing professional development and defining ethical behavior.

Happy Anniversary!

These anniversaries mark employees' years of service with the MDMR.

We thank them for their dedicated service to the management of our marine resources.

Scott Gordon.....	10/01/97
Barbara Synowiez.....	10/01/99
Paul Grote.....	10/01/00
Scott Anderson	10/01/01
Jack Ewing.....	10/01/01
Patrick Levine	10/01/01
Leslie Gollott.....	10/01/02
Dave Ruple.....	10/01/02
Lauren Clark	10/01/07
Paul Elmore.....	10/01/09
Bryan Wallace.....	10/01/09
Jacob Winborn.....	10/01/10
Jake Walker.....	10/09/06
Irvin Jackson.....	10/12/98
Teresa Stadler.....	10/18/04
Jeremy Overstreet.....	10/26/10
Kara Vesa	11/01/96
Tina Johnson.....	11/01/97
Bill Richardson.....	11/01/98
Beth Roberts.....	11/01/99
Scott Chatham	11/01/00
Tommy Jennings.....	11/01/00
Chris Mask.....	11/01/00

Kyle Wilkerson	11/01/00
Patrick Carron.....	11/01/09
Tamra Carrell	11/03/04
Kimberly Denz.....	11/08/04
Lynn Moore	11/08/10
Jay McIlwain	11/19/07
Tom Strange.....	11/19/07
Debbie Snawder	11/30/09
Traci Floyd	12/01/97
Mike Walker	12/01/97
Brandon Hall	12/01/98
Shelly Becker.....	12/01/07
Kerwin Cuevas.....	12/02/96
Joe Jewell.....	12/08/97
Brittany Chudzik.....	12/13/04
Curtis Culpepper.....	12/19/05
Matt Kasovich	12/19/05
Roy Lipscomb.....	12/20/06
Mario Sapet	12/22/03
Mai Dang	12/22/07
Robin Vaughn	12/23/06
John Ladner.....	12/29/05
Ali Leggett.....	12/29/05

Thanks!

*to all who contributed to
this issue of Coastal Markers:*

Joe Jewell, Traci Floyd,
Mike Brainard, Kerwin Cuevas,
Donnie Armes, Dave Ruple,
Jeff Clark, Ruth Posadas,
Jessica Rankin, Jeff Davis,
Mike Walker, Sandra Moore,
Christy Royals, Susan Perkins,
Buck Buchanan, Irvin Jackson,
Dr. Fred Deegen, Amy Taylor,
Christine Murrell



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MDMR Calendar

February 21

Mississippi Commission on Marine Resources meeting, Bolton Building, 1141 Bayview Ave., Biloxi, 9 a.m.

March 20

Mississippi Commission on Marine Resources meeting, Bolton Building, 1141 Bayview Ave., Biloxi, 9 a.m.

March 31

Celebrate the Gulf Marine Education Festival, War Memorial Park, Pass Christian, 10 a.m.-4 p.m. For information, call Jennifer Buchanan at 228-475-7047.

April 17

Mississippi Commission on Marine Resources meeting, Bolton Building, 1141 Bayview Ave., Biloxi, 9 a.m.

April 22

Earth Day

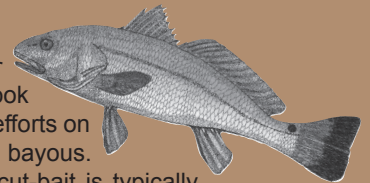
To receive your
Coastal Markers
via e-mail, contact
lauren.thompson@dmr.ms.gov



Celebrate the Gulf, March 31, 2012

Doc's Fishing Tip

Brrr... January fishing is definitely NOT for everyone; but anglers intent on wetting a hook can enjoy plenty of success by focusing their efforts on the deeper areas of our backwater bays and bayous. Bottomfishing for black drum on a piece of cut-bait is typically best this time of year while trolling a live cocahoe minnow for trout can also be good at times. Purists will also catch their share of fish on deep-running plugs and soft plastics. It's going to be cold for sure, but from the Wolf and Jourdan rivers to the West to Graveline Bayou and the Pascagoula River on the East, the fishing could be surprisingly hot...



Until next time, good fishing! — Dr. Fred Deegen

Illustration: Joe Jewell

Mississippi Gulf Shrimp Scampi

2 lbs. Jumbo Mississippi Gulf Shrimp (4-5 per person)
1/2 cup butter
1/4 cup chopped parsley
1 tbsp. salt
1/2 tbsp. lemon peel
Garlic powder
2 tbsp. lemon juice



Preheat oven to 400 degrees. Peel shrimp, leaving tail on. De-vein and wash; drain on towels. Melt butter in a 9-inch by 13-inch pan in the oven. Add other ingredients except shrimp. Place shrimp in the pan and turn once. Bake five minutes and turn again. Be sure parsley covers shrimp. Bake eight to 10 minutes longer. Arrange shrimp on a serving dish and pour the sauce on top.

Reprinted from MDMR's *Get Hooked on Mississippi Seafood Recipe Book*
Recipe by Pat Daughdrill